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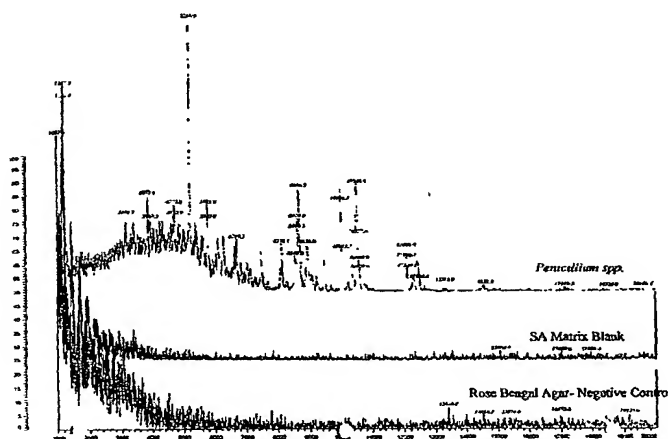
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(54) Title: METHODS FOR USING MASS SPECTROMETRY TO IDENTIFY AND CLASSIFY FILAMENTOUS FUNGI, YEASTS, MOLDS AND POLLEN

MALDI-TOFMS of *Penicillium* Spp

(57) Abstract: A method for the identification and classification of filamentous fungi, yeasts, molds, toxins produced by fungi, and pollen in air environmental and biological samples using genus, species and strain specific biomarkers is provided. The biomarkers can be generated using mass spectrometers and particularly by matrix assisted laser desorption ionization time-of-flight mass spectrometry (MALDI-TOF-MS) analyses of filamentous fungi, yeasts, molds, toxins produced by fungi, and pollen.

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